

(19) World Intellectual Property
Organization
International Bureau



(43) International Publication Date
6 May 2005 (06.05.2005)

PCT

(10) International Publication Number
WO 2005/040372 A1

- (51) International Patent Classification⁷: C12N 9/58, (74) Common Representative: NOVOZYMES A/S;
9/76, C11D 3/386 Krogshøjvej 36, Att: Patents, DK-2880 Bagsværd (DK).
- (21) International Application Number: PCT/DK2004/000730 (81) Designated States (*unless otherwise indicated, for every kind of national protection available*): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.
- (22) International Filing Date: 22 October 2004 (22.10.2004)
- (25) Filing Language: English
- (26) Publication Language: English
- (30) Priority Data: PA 2003 01562 23 October 2003 (23.10.2003) DK (84) Designated States (*unless otherwise indicated, for every kind of regional protection available*): ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).
- (71) Applicant (*for all designated States except US*): NOVOZYMES A/S [DK/DK]; Krogshøjvej 36, DK-2880 Bagsværd (DK).
- (72) Inventors; and
- (75) Inventors/Applicants (*for US only*): WU, Wenping [CN/CN]; Er Dan Yuan, Bldg #3, Room 13, Yi Qu, Dong Li Xiao Qu, Shang Di Zone, Haidian District, Beijing 100085 (CN). JOKUMSEN, Kirsten, Væver [DK/DK]; Fasanvej 11, DK-2970 Hørsholm (DK). STRINGER, Mary, Ann [US/DK]; Søborg Hovedgade 39C, 3.tv., DK-2860 Søborg (DK).
- Published:
— with international search report
- For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.*

(54) Title: PROTEASE WITH IMPROVED STABILITY IN DETERGENTS

(57) Abstract: The present invention relates to proteases having improved stability in detergent compositions. Further, the present invention relates to cleaning and detergent compositions comprising the proteases of the invention as well as to use of such protease in detergent compositions.

WO 2005/040372 A1